

The Sony logo is displayed in a bold, black, sans-serif font.

3-757-954-21 (1)

FM Stereo/AM PLL Synthesized Headphone Radio

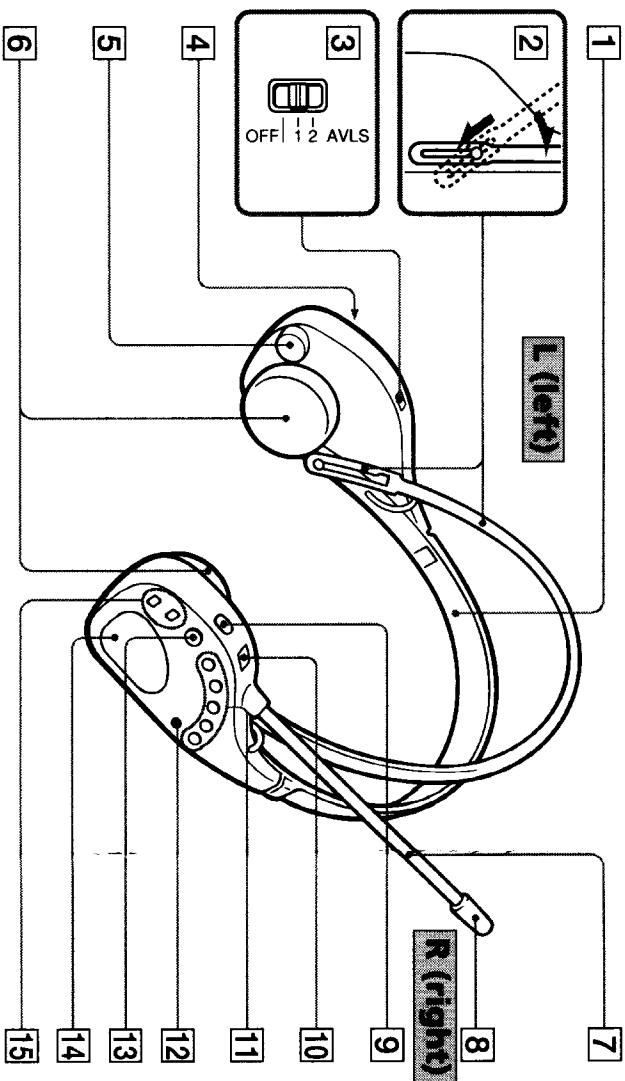
SRF-HM22

Operating Instructions

Before operating the unit, please read this manual thoroughly and retain it for future reference.

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Locations of Controls



1 Headband

Adjust it to your head.

2 Support band

Before putting on the receiver, pull out the support band fully from the headband. Then adjust it to fit your head.

When the receiver is not in use, put the support band back by pushing down both ends as illustrated.

3 AVLS selector

When this selector is set to either position 1 or 2, (around 95 dB, 85 dB respectively) the volume will be kept at a moderate level without degradation of the sound quality, even if you attempt to turn the volume up higher.

When this selector is turned off, you will be able to enjoy the full volume capability of your radio.

4 Battery compartment

5 VOL (Volume) control

6 Driver units

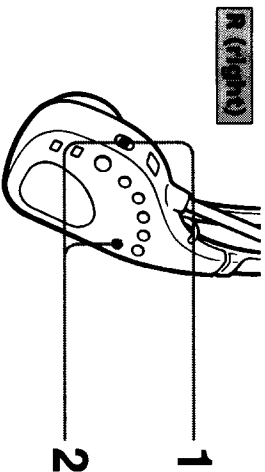
7 FM flexible antenna

Use for FM reception.

8 Light reflector

This reflector reflects car lights at night for your safety.

Changing AM channel step



1 Turn off the power by pressing the POWER button, if it is turned on.

2 While pressing the ENTER/CLOCK button, keep pressing the POWER button for more than 5 seconds.

The AM tuning interval has been changed. If you repeat step 2, the interval changes again.

Note

If you perform the steps above, the clock and the preset memory are canceled, and "AM 12:00" flashes.

9 POWER button

10 FM SENS (Sensitivity) DX/LOCAL selector

11 Preset buttons

These buttons can preset up to 5 stations in each band.

12 ENTER/CLOCK button

Use for storing station and setting clock.

13 BAND button

Use for changing FM and AM.

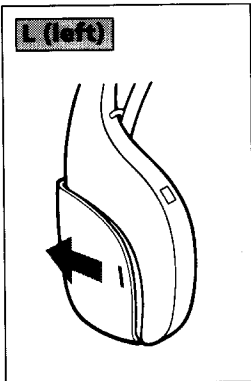
14 Display window

The indicator displays the power remaining in the batteries, the frequency, the preset number and the time.

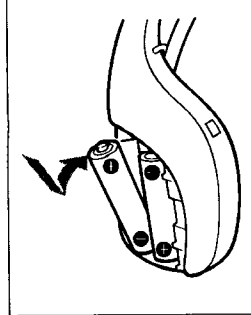
15 TUNE (tuning)/TIME SET (+ and -) buttons

Use for tuning the frequency and setting time.

Installing Batteries



Size AAA (R03) × 2



When to replace the batteries

When the batteries become weak, sound becomes weak or the stereo sound becomes monaural. When the batteries are run down completely, the power is turned off and the " o o o " in the display window flashes. When the power is turned on with the indication flashing, the power is turned off right away. While the " o o o " starts flashing, replace both batteries with new ones. After the batteries are replaced, turn the power on again to stop the flashing of the indication.

When replacing the batteries

Replace the batteries within about 30 seconds. If you do not replace them within 30 seconds, the preset stations may be canceled, and "AM 12:00" flashes in the display window. For battery life, see "Specifications".

To avoid damage from battery leakage and corrosion

Remove the batteries when you do not use the unit for a long time.

When the batteries are removed for a long time

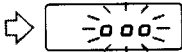
Preset stations are canceled and "AM 12:00" is displayed. Preset stations again and reset the clock.

The indication of the power remaining in the battery

New batteries -----> Used batteries



When the power has been exhausted

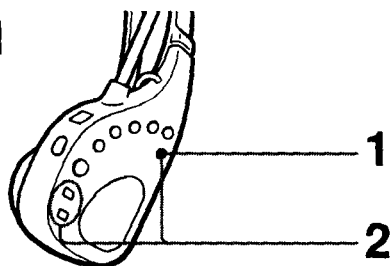


When you turn on the unit, the power remaining in the battery is displayed for about one second and a half. The unit displays one of the four indications depending on the power remaining in the battery.

Setting the Clock

Set the clock or display time when the radio is turned off.

R (right)



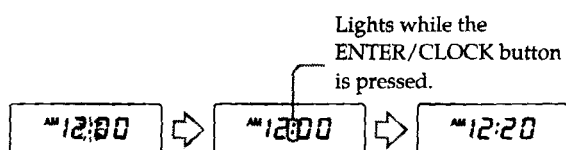
- 1** When you insert batteries for the first time, digits flash in the display window. To stop flashing, press the ENTER/CLOCK button.

AM 12:00 = midnight

PM 12:00 = noon

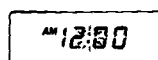


- 2** While pressing the ENTER/CLOCK button, press the TUNE/TIME SET buttons ("+" or "-") to set the clock to the current time. Each time the TUNE/TIME SET button is pressed, the digits move forward or back by one. When you keep the button pressed, the digits change rapidly.

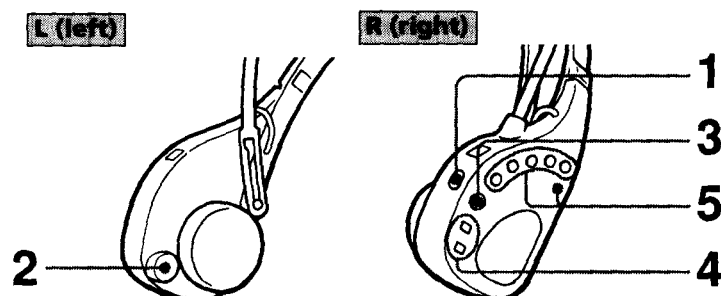


- 3** When you release the ENTER/CLOCK button, the clock starts to operate and ":" of the time indication flashes.

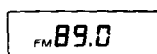
If you release the ENTER/CLOCK button simultaneously with the time signal as it sounds, the clock starts from zero second.



Tuning in and Presetting Stations



- 1 Press the POWER button.
- 2 Adjust the VOL (volume).
- 3 Select a desired band.



- 4 Tune in a desired station.
+: To tune in a higher frequency.
-: To tune in a lower frequency.

- 5 Store the station.
While keeping the ENTER/CLOCK button pressed, press the desired preset number button. Then the preset number appears in the display window.



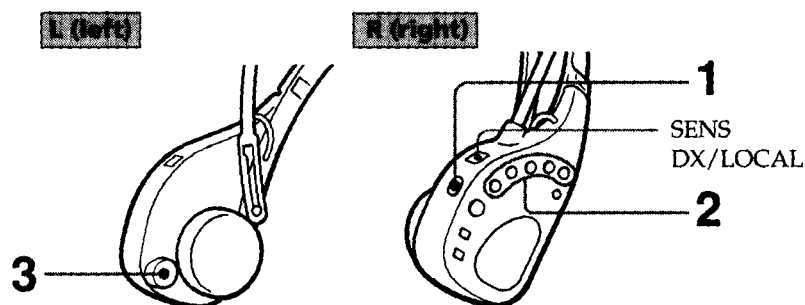
Repeat these steps for each station to be preset.
Up to 5 stations in each band can be preset.

To turn off the radio, press the POWER button.

To change the preset station

Preset a new station to a desired preset button; the station previously preset for that button will be erased.

Listening to a Preset Station



- 1 Press the POWER button.
- 2 Press the desired preset button.
- 3 Adjust the VOL (volume).

On FM SENS DX/LOCAL Selector

DX: Normally set it to this position and the radio operates in stereo mode for FM stereo programs and will be automatically switched to mono for non-stereo programs.

LOCAL: Set it to this position, if a very strong station signal causes noise or if multipath* occurs. The reception will be more stable and noise will be reduced.

* Multipath, which often occurs in a street with big buildings or in a mountainous area, is reflection of signals that reach the receiver from structures or hills considerably later than direct signals. A multipath condition brings about high-frequency noise, distortion, and a poor stereo effect in FM reception.

Precautions

- Do not open the unit. Refer servicing to qualified personnel only.
- Operate the unit on 3 V DC with two size AAA (R03) batteries.
- When the unit is not to be used for a long period of time, remove the batteries to avoid unit damage from battery leakage.
- Avoid exposure to temperature extremes, direct sunlight, moisture, sand, dust, or mechanical shock. Never leave in a car parked in the sun.
- Should any liquid or solid object fall into the unit, remove the batteries, and have the unit checked by qualified personnel before operating it any further.
- Clean the unit with a soft cloth dampened with a mild detergent solution. Never use abrasive cleansers or chemical solvents, as they may mar the unit.
- In vehicles or buildings, radio reception may be difficult or noisier. Try listening near a window.
- If there is lightning when you are using the unit, take off the headphone radio immediately.
- Never use an electric hair dryer while wearing the headphones.

Note on AM channel step

The AM channel step differs depending on areas. The channel step of this unit is factory-set to 10 kHz. You can change the channel step (See "changing AM channel step".)

Area	Channel Step
North American countries	10 kHz
Other countries	9 kHz

Notes on headphones

Road Safety

Do not use headphones while driving, cycling, or operating any motorized vehicle. It may create a traffic hazard and is illegal in many areas. It can also be potentially dangerous to play your headsets at high volume while walking, especially at pedestrian crossings. You should exercise extreme caution or discontinue use in potentially hazardous situations.

Preventing hearing damage

Avoid using headphones at high volume. Hearing experts advise against continuous, loud and extended play. If you experience a ringing in your ears, reduce volume or discontinue use.

Caring for others

Keep the volume at a moderate level. This will allow you to hear outside sounds and to be considerate to the people around you.

If you have any questions or problems concerning your unit that are not covered in this manual, please consult the nearest Sony dealer.

Troubleshooting Guide

Trouble	Causes
Sound is not heard at all.	<ul style="list-style-type: none">• Incorrect polarity of batteries.• Weak batteries.• VOL is turned down completely.
Very weak or interrupted sound, distorted sound when volume is turned up, or unsatisfactory reception.	<ul style="list-style-type: none">• Weak batteries.• Incorrect tuning.• Weak signal. ➡ When in a vehicle or in a building, listen near a window.• SENS is set to LOCAL. ➡ Set it to DX
Presetting cannot be made.	<ul style="list-style-type: none">• Incorrect presetting. ➡ When storing the station, preset ENTER before pressing the desired preset button.
The preset station cannot be received.	<ul style="list-style-type: none">• Incorrect preset button has been pressed.• The preset station has been cleared when replacing batteries. (Batteries should be replaced within thirty seconds.)
No display even when POWER is on.	<ul style="list-style-type: none">• Weak batteries.

Owner's Record

The model number is located at the right rear and the serial number at the left rear.
Record the serial number in the space provided below.
Refer to them whenever you call upon your Sony dealer regarding this product.

Model No. SRF-HM22 Serial No. _____

Features

- FM Stereo/AM PLL (Phase Locked Loop) synthesized headphone radio
- Adjustable double headbands designed to fit your head
- The AVLS (Automatic Volume Limiter System) to allow you to limit the maximum volume without degrading the sound quality
- Capability to preset up to 5 stations in each band preset in the desired order
- Light reflector to reflect car lights at night for your safety

Specifications

Frequency range (Channel Step)
FM:87.5-108 MHz (0.1 MHz)
AM:530-1,710 kHz (10 kHz)

FM:87.5-108 MHz (0.05 MHz)*
AM:531-1,710 kHz (9 kHz)

Headphone type
Dynamic

Power output
20 mW + 20 mW (at 10%
harmonic distortion)

Power requirement
3 V DC
two size AAA (R03) batteries

Battery life
For FM reception:
Approx. 32 hours with Sony
alkaline AM4 (N)
Approx. 17 hours with Sony
UM-4 (NU)
For AM reception:
Approx. 40 hours with Sony
alkaline AM4 (N)
Approx. 22 hours with Sony
UM-4 (NU)

Mass Approx. 154 g (5 oz)
including batteries

* The frequency display is raised or lowered by steps of 0.1 MHz.(Example: Frequency 88.05 MHz is displayed as "88.0 MHz".)

Design and specifications are subject to change without notice.

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San Jose 1359 Old Oakland Road San Jose, CA 95112 (408) 280-7669	Kansas City 11712 West 95th Street Overland Park KS 66214 (913) 888-2622	Pennsylvania
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Atlanta 120 Interstate North Parkway East Suite 410 Atlanta, GA 30339 (404) 953-5871	Detroit 43304 Eleven Mile Road Novi, MI 48050 (313) 344-4044	Washington
	Minnesota	Seattle 835 Fidalgo Seattle, WA 98108 (206) 762-6500
	Minneapolis 4300 W. 36 1/2 Street St. Louis Park, MN 55416 (612) 920-8000	

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Southwestern District Sony Service Company 3201 Premier Dr., Suite 100 Irving, TX 75063 (214) 550-5270		Southeastern District Sony Service Company 120 Interstate North Parkway East Suite 414 Atlanta, GA 30339 (404) 953-5858

SONY®

TRANSISTOR RADIO

LIMITED WARRANTY

SONY ELECTRONICS INC. ("SONY") warrants this product against defects in material or workmanship, as follows:

1. For a period of 1 year from the date of purchase, SONY will pay the labor charges of your SONY authorized service facility to repair the defective product. After this 1 year period, you must pay for all labor charges.

2. In addition, SONY will supply, at no charge, new or rebuilt replacements for defective parts for a period of 1 year from the original date of purchase.

To obtain warranty service, you must take the product, or deliver the product prepaid, to a SONY authorized service facility.

This warranty does not cover cosmetic damage, and damage due to acts of God, accident, misuse, abuse, or negligence to this product including antenna. This warranty is valid only in the United States of America.

Proof of purchase in the form of a bill of sale or receipted invoice which is evidence that the unit is within the warranty period must be presented to obtain warranty service.

This warranty is valid only if the serial number appears on the product.

REPAIR OR REPLACEMENT AS PROVIDED UNDER THIS WARRANTY IS THE EXCLUSIVE REMEDY OF THE CONSUMER. SONY SHALL NOT BE LIABLE FOR ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES FOR BREACH OF ANY EXPRESS OR IMPLIED WARRANTY ON THIS PRODUCT. EXCEPT TO THE EXTENT PROHIBITED BY APPLICABLE LAW, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE ON THIS PRODUCT IS LIMITED IN DURATION TO THE DURATION OF THIS WARRANTY.

Some states do not allow the exclusion or limitation of incidental or consequential damages, or allow limitations on how long an implied warranty lasts, so the above limitations or exclusion may not apply to you. This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

For your convenience, Sony Electronics Inc. has established the Customer Information Center to supply you with product or service information.

Important: If returning product for service, please see reverse side of this card for your nearest Sony Service Center.

SONY CUSTOMER INFORMATION CENTER

201-930-SONY (7669)

714-821-SONY (7669)

708-250-SONY (7669)

or write to:

Sony Customer Information Center

Sony Drive, Mail Drop #T1-11

Park Ridge, NJ 07656

SONY ELECTRONICS INC.

Sony Drive, Park Ridge, New Jersey 07656